

Project Demo

ENSC 427 Final Project:

Simulation of the ZigBee PAN Protocol in OPNET
as a Basis for the Comparison of Competing
Sensor Network Technologies

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Project Description

- Three Case Studies
- 1) Determine effect of adding incrementally more end devices to network, on an end device's end-to-end delay between it and coordinator
- 2) Determine effect of suddenly flooding network with incrementally more devices, on an end device's end-to-end delay between it and coordinator
- 3) Determine effect of adding routers and therefore hops between end device and coordinator

Implementation Details

- Case 1 Scenarios
 - Explain purpose of Case 1
 - Show network model
 - Show simulation results
 - Show trajectories using Time Controller
 - Explain significance of simulation results

Implementation Details

- Case 2 Scenarios
 - Explain purpose of Case 2
 - Show network model
 - Show simulation results
 - Explain significance of simulation results

Implementation Details

- Case 3 Scenarios
 - Explain purpose of Case 3
 - Show network model
 - Show simulation results
 - Explain significance of simulation results

Design and Code Development

- MiWi P2P MAC Process Model
- Code for MiWi P2P MAC Process Model

Questions

